signed certifies that this correspondence is being sent via first-class mail, postage prepaid, in an envelope

addressed to the Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450,

this 18th day of January, 2005.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant:

Dubin et al.

Atty. Docket: ORT1502-CON

Serial No.:

10/661,378

Art Unit:

unknown

Filed:

12 September 2003

Examiner:

unknown

For:

DNA Encoding A Human

Confirmation No.: 6696

Subunit 5HT3-C Of The 5HT3 Serotonin Receptor

Commissioner for Patents P.O. Box 1450 Alexandria, VA 22313-1450

INFORMATION DISCLOSURE STATEMENT

Sir:

Pursuant to 37 C.F.R. § 1.56 and in accordance with 37 C.F.R. §§ 1.97-1.98, Applicant submits the accompanying Form PTO-1449 citing references relating to the application.

This Statement is being filed under the provisions of 37 C.F.R. § 1.97(b)(3), i.e., before the mailing of a first Office Action on the merits. In the event that a first Office Action on the merits has been mailed, then this Statement is being filed under 37 C.F.R. § 1.97(c)(2) and the Commissioner is requested to charge Deposit Account No. 10-0750 for the fee set forth in 37 C.F.R. § 1.17(p).

Each reference listed on the accompanying form is in the English language.

Copies of the references listed on pages 1 through 4 of the accompanying form are not enclosed since such references were previously submitted to, or cited by, the USPTO in Application Serial No. 09/955,524 (which published as U.S. Patent

Application Publication No. US 2002/0137138) and/or application Serial No. 09/388,349

(which issued as U.S. Patent No. 6,365,370), both of which are relied on for priority

purposes under 35 U.S.C. § 120. Copies of the references listed on page 5 of the

accompanying form are enclosed.

The references listed on page 5 of the accompanying form were cited in a

Supplementary Partial European Search Report or an International Search Report of a

counterpart European application or PCT application, respectively. Copies of the

Supplementary Partial European Search Report and International Search Report are

enclosed herewith.

This Statement should not be construed as an admission that any information

provided herewith is material as that term is defined in 37 C.F.R. § 1.56(b) or that any

cited reference qualifies as prior art. This Statement should not be construed as a

representation that a search has been made, or that information more material does not

exist.

The Examiner is respectfully requested to initial the citations on the Form PTO-

1449 to confirm consideration of each reference.

Respectfully submitted,

Date: January 18, 2005

Linda S. Evans

Reg. No. 33,873

Johnson & Johnson

One Johnson & Johnson Plaza

New Brunswick, New Jersey 08933-7003

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:								d Channels: A Range O pp. 305-309 (1996).	f Recep	otor	Types	And Stru	ctures,"			
								tional Expression Of A I Irmacol., Vol. 48, pp. 105				ryptamin	е Туре-			
		Bo Dir (19	3A _s Receptor Subunit," <i>Mol. Pharmacol.</i> , Vol. 48, pp. 1054-1062 (1995). Boess et al., "Analysis Of The Ligand Binding Site Of The 5-HT ₃ Receptor Using Site Directed Mutagenesis: Importance Of Glutamate 106," <i>Neuropharm.</i> , Vol. 36, pp. 637-647 (1997).													
		Re	cepto	r In T	Γhe	Human Fore	bra	Characterization Of Thin," Neuropharm., Vol. 3	2(12), p	p. 1	1325-13	31 (1993	3).			
								ubunit Is A Major De 397, pp. 359-363 (1999		nt	Of Ser	otonin-R	eceptor			
		1 1	rkach 706-				tors	Are Membrane Ion Cha	annels,"	Na	ture (Lo	ndon), V	ol. 339,			
		Fle	tcher	et	al.,	"Desperate		Seeking Subunits: Are Pharmacol. Sci., Vol. 1					Really			
								i-Hydroxytryptamine-3 R					ain", <i>Br.</i>			

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EXAMINER

Acetylcholine Receptor Subunits", *Neuropharm.*, Vol. 37, pp. 397-399 (1998).

J. Pharmacol., Vol. 122, pp. 655-662 (1997).
Fletcher et al., "Evidence That Porcine Native 5-HT₃ Receptors Do Not Contain Nicotinic

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			Furutani et al., "Novel Mechanism Associated With An Inherited Cardiac Arrhythmia: Defective Protein Trafficking By The Mutant HERG (G601S) Potassium Channel",															
			Circulation, Vol. 99, pp. 2290-2294 (1999).															
			Gralla, "Antiemetic Therapy," Semin. Oncol., Vol. 25, pp. 577-583 (1998).															
			Greenshaw et al., "The Non-Antiemetic Uses Of Serotonin 5-HT ₃ Receptor Antagon Clinical Pharmacology and Therapeutic Applications," <i>Drugs</i> , Vol. 53(1), pp. 20-39 (199															
		R	Gurley et al., "Nicotinic Agonists Competitively Antagonize Serotonin At Mouse 5-H7 Receptors Expressed In Xenopus Oocytes," <i>Neurosci. Letters</i> , Vol. 247, pp. 107-11 (1998).															
		Hugnot et al., "Kv8.1, A New Neuronal Potassium Channel Subunit with Specific Inhibit Properties Towards <i>Shab</i> And <i>Shaw</i> Channels," <i>EMBO J.</i> , Vol. 15(13), pp. 3322-33 (1996).																
		Jan et al., "Voltage-Gated And Inwardly Rectifying Potassium Channels," J. Phys. Vol. 505(2), pp.267-282 (1997).																
		L	Lambert et al., "5-HT3 Receptors" In Ligand- Voltage-Gated Ion Channels, (R. North (Ed. CRC Press - Boca Raton, FI), Chp. 5, pp. 177-211 (1995).															
		Ir	Lummis et al., "Radioligand Binding And Photoaffinity Labeling Studies Show A Direct Interaction Of Phenothiazines At 5-HT ₃ Receptors," <i>Neuropharm.</i> , Vol. 36(4/5), pp. 665 670 (1997).															
		H	lydro ′ol. 4	0xy1	trypt pp. 1	am 8-2	ine₃ Recepto 23 (1992).	rs From N1	E-115 Neurob	olastoma	a Cells," A	nstitution Of 5- Mol. Pharmacol.,						
		R (*	Lummis et al., "Characterization Of [3H]Meta-chlorophenylbiguanide Binding To 5-HT ₃ Receptors In N1E-115 Neuroblastoma Cells," <i>Eur. J. Pharmacol.</i> , Vol. 243, pp. 7-11 (1993).															
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	Oin		Mati	hur	et al	"	le-177 And Se	or-180 in The S1 Segment	Are Criti	cally Impor	tant In Kv1 1							
		Mathur et al., "Ile-177 And Ser-180 In The S1 Segment Are Critically Important In Channel Function," <i>J. Biol. Chem.</i> , Vol. 274(17), pp. 11487-11493 (1999).																
	Mikayama et al., "Molecular Cloning And Functional Expression Of A cDNA E																	
	Glycosylation-Inhibiting Factor," <i>Proc.Natl. Acad. Sci. USA</i> , Vol. 90, pp.10056 (1993).																	
			Miller et al., "Membrane-Bound And Solubilized Brain 5HT ₃ Receptors: Improved															
			Radioligand Binding Assays Using Bovine Area Postrema Or Rat Cortex And The Radioligands ³ H-GR65630, ³ H-BRL43694, And ³ H-LY278584, "Synapse (NY), Vol. 11, pp.															
			Radioligands H-GRososo, H-BRL43694, And H-L1278584, Synapse (N17), Vol. 11, pp.															
				_			Molecular Clo	ning of Human 5-Hydroxytr	vptamin	e ₃ Recepto	r: Heterogeneity							
				Distr				n Among Species," <i>Mol. I</i>										
								Potentials of Itasetron (DA										
							Гhe Treatmen (1996).	t Of Central Nervous Syste	m Disor	ders," CNS	S Drug Rev., Vol.							
			Pete	ers	et al	٠,	"Recent Adva	ances in the Electrophysic			zation of 5-HT ₃							
			Rec	epto	ors,"	Tre	ends Pharmac	ol. Sci., Vol. 13, pp. 391-39	7 (1992	<u>). </u>	0.4.0.1							
			Salıı <i>Biol.</i>	nas . <i>Ch</i>	et al. em.,	, " Vc	Modes of Reg ol. 272(13), pp	julation Of <i>Shab</i> K⁺ Channe 5. 8774-8780 (1997).	el Activit	y By The K	v8.1 Subunit," <i>J.</i>							
						-		tory α Subunits For Mamn 71-24379 (1997).	nalian S	Shab K⁺ Ch	annels," <i>J. Biol.</i>							
			Sha	laby	et a	l.,	"Dominant-Ne	egative KvLQT1 Mutations	Underli	e The LQT	1 Form Of Long							
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		Shuck et al., "Cloning And Characterization Of Two K ⁺ Inward Rectifier (K _{ir}) 1.1													
	Channel Homologs From Human Kidney (K _{ir} 1.2 and K _{ir} 1.3)," <i>J. Biologica</i> 272(1), pp. 586-593 (1997).														
	-					ition Citos	tion Sites In The Rat Brain Using The								
	ļ														
		Agonist Radioligand [3H]Meta-chlorophenylbiguanide," <i>Eur. J. Pharmacol.</i> , Vol. 18 (1993).													
					lly Silent K⁺ Channel										
		(alph (199	•	Subu	ınit	s Of The Ra	t Kv9 Subfamily," <i>J. I</i>	Veurochem.	, Vol. 72(4), pp.1725-1734					
							amine Is A Fast Excita		nitter At 5-h	HT ₃ Receptors In					
							. 8, pp. 199-203 (1992) ainst The 5-HT₃-A Rec		ν Δ 54 kDs	Protein Affinity					
							Mol. Neuropharmacol.,								
							lation Controls Conduc		HT₃ Recept	tor Ligand-Gated					
							nels, Vol. 3, pp. 7-12 (*			00.004 (4000)					
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	İ						roscience, Vol. 31(2), p			ino visualizatiUII					
		Yake	el e	t al.,	"/	Activation An	d Desensitization Of T	he 5-HT ₃ R	eceptor In	A Rat Glioma x					
		Mou	se N	Veur	obla	astoma Hybri	d Cell," J. Physiol. (Lon	don) Vol. 4	36, pp. 293	-308 (1991).					
	İ						Mutations in Kv1.1								
		2848			_	itive Effects (Or Haploinsufficiency,"	J. Neurosci	ence, Vol.	18(8), pp. 2842-					
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